

About correlation analysis of chemical compound of atmospheric precipitation in the North of the Russian plain

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Abstract

©, 2014, SGEM2014. The paper deals with estimation of spatial and temporal variability of magnitude and number of statistically significant coefficients of correlation between components of chemical compound of atmospheric precipitation in the North of the Russian plain. There is direct relationship between magnitude of correlation coefficients and chemical composition of atmospheric precipitation. For example, in space aspect the greatest number of significant correlation coefficients meets on coastal and city continental weather stations. Finally, in temporal (seasonal) aspect this regularity is observed in May, i.e. ion concentration increases in the air during the season of photochemical activity.

Keywords

Aerosols, Atmospheric precipitation, Chloride ions, Condensation nuclei, Correlation analysis, Statistically significant correlation coefficient, Weather station